

An essay on
the History and Theory
of Menstruation;
by Edward F. Scott,
of Dinwiddie County
Virginia.

October 25th

A. D. 1820.

admitted March 9th 1821

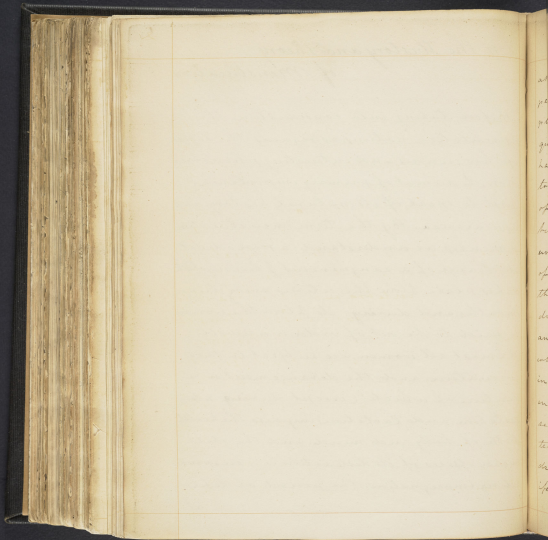
The day on
the 1st of March
of 1844
I began to
write a
letter to
my dear
friend
and
brother
John
and
to
tell
you
of
the
many
things
which
I
have
done
and
to
tell
you
of
the
many
things
which
I
have
seen
and
to
tell
you
of
the
many
things
which
I
have
heard
and
to
tell
you
of
the
many
things
which
I
have
felt
and
to
tell
you
of
the
many
things
which
I
have
thought
and
to
tell
you
of
the
many
things
which
I
have
done
and
to
tell
you
of
the
many
things
which
I
have
seen
and
to
tell
you
of
the
many
things
which
I
have
heard
and
to
tell
you
of
the
many
things
which
I
have
felt
and
to
tell
you
of
the
many
things
which
I
have
thought

On the History and Theory
of Menstruation.

Before taking into consideration, the speculative notions, as regards, the cause of this curious and interesting phenomenon, I deem it of primary importance, first, to speak of its natural history, and appearance. By the term menstruation, or menses, we understand, a periodical discharge of a sanguineous fluid, which takes place from the uterus every lunar month; and during its flow the woman is said to be out of order, or unwell.

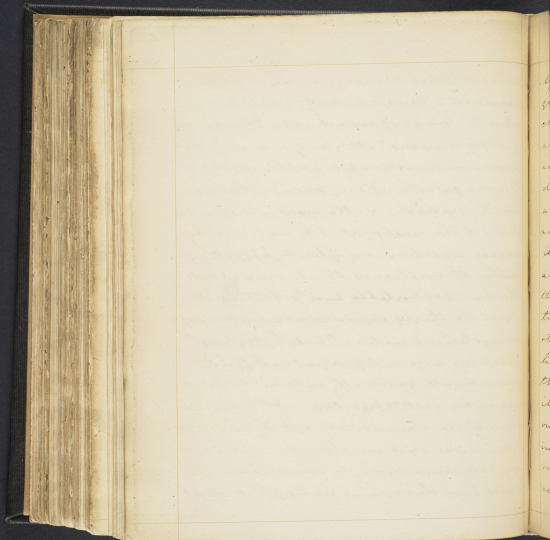
Almost all women, are subject to this evacuation, and the derangement, or retention of which, (except during utero gestation, and lactation) impairs the health, both of body and mind, and the still higher offices of its destination is suspended viz impregnation. The period of life

at

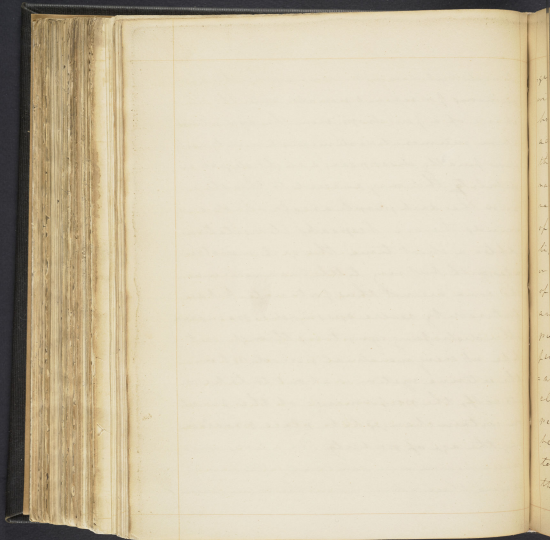


at which this discharge, makes its first appearance, is termed puberty, which term, implies the power of reproduction. It not unfrequently happens, with young women, who have never menstruated, for this discharge to come on without any premonitory signs of its approach, or attendant indisposition, but for the most part, it is preceded by uneasy sensations, very often by affections of the stomach and bowels, pain about the lumbar vertebrae and pelvis, traveling down the thighs, and various symptoms of an hysterical nature. These affections, which are more or less urgent in different individuals, gradually subside; but at the end of a month, they return with increased severity, accompanied with colicky pains, quick tense pulse, and now and then with a hot, dry skin, and desire to vomit. These now issues from the vagina, a serous fluid, slight,

by

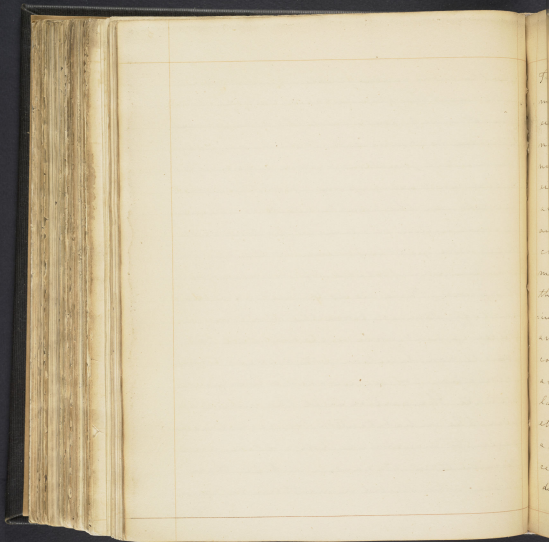


ly red, but does not become perfectly sanguineous for several periods. After the discharge of a few drops, even, the symptoms above enumerated diminish in intensity and finally disappear; a slight degree of debility tho' may succeed to this stage, and the dark purple areola which surrounds the eye, bespeaks its visitation. After a short time, the girl menstruates, with but very little inconvenience, tho' some are not thus fortunate, but are tortured by severe spasmodic pains and other distressing symptoms through out life at every menstrual period. When the uterine system is about to take on its self, the performance of this function, certain changes take place proclaiming the age of puberty. The uterus and ovaria, become more developed, and finally receive their adult form; the vagina also



ages; the mons veneris swells up, and is covered with hair; the glandular substance of the breast is unfolded, and the cellular and adipose part increased; at the same time the mental functions become more invigorated, and new passions assert their sovereignty over the female heart. The varieties of constitution, of climate, and mode of life, have great influence on the earlier or later manifestation of this phenomenon of puberty. There seems to exist, a very strong analogy, derived from the vivifying impulse of heat, upon vegetables, and the female constitution with respect to menstruation; for in general, the warmer the climate, the earlier will the menses appear. The inhabitants of tropical climates, begin to menstruate long before, and terminate much earlier in life, than those who dwell in northern regions.

Thus,



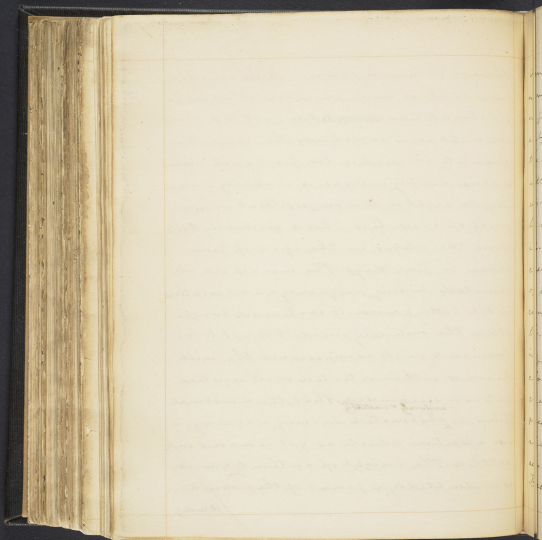
Thus, in Asia and Africa, the catamenia make their first appearance at ten or even eight, or nine years of age. Whilst in the northern countries of Europe, women do not arrive at puberty, untill they are sixteen, twenty or twenty five years olds; and on the authority of Linnæus, we are authorised in saying, that in very cold climates, such as Lapland, that the menstrual flux does not recur more than twice or thrice a year, and that during the summer season. In this country, and the temperate parts of Europe, it commonly appears, between the thirteenth and sixteenth years, and continues regularly, for the most part, untill the fortieth, forty fourth or fifth years, lasting for a period of about triginti annos, when it ceases. The quantity, emitted at every period depends much on the variety of constitution,

of

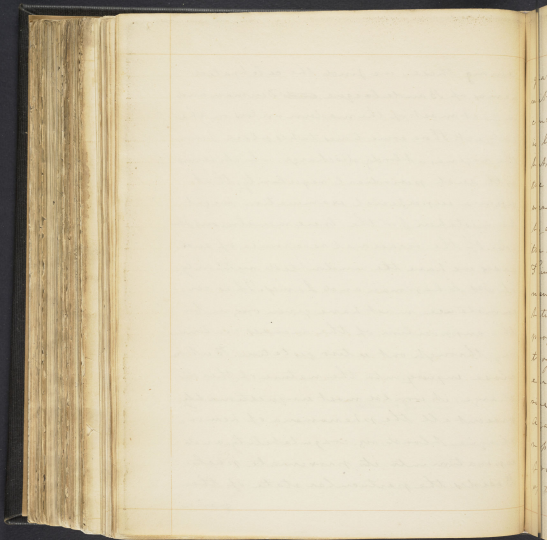
6
of climate, and the greater or less degree of refinement in the individuals; but, it frequently varies in different women of the same climate, and even in the same woman at different periods. In this, as in all other temperate climates, the amount commonly discharged, varies from three to five or six ounces. There is, also, no little variety, as regards the lapse of time between, and, for the completion of each menstrual period. In some, it returns with an uncommon degree of accuracy; to the very day or hour, whilst in others, it may vary several days, without occasioning any inconvenience whatever. The length of time, necessary for the perfection of the period, is also subject to many contingencies; for instance, we meet with some cases, which do not require more than a few hours, when in others, and especially those

Those, who live luxuriously, and are confined, to close warm chambers, demand for its completion ~~crossed letters~~, not less than six, eight and sometimes ten days, the quantity evacuated too, from such women is considerably increased, probably amounting to eight or ten ounces. But in ^{large} majority of cases, this fluid gradually discharges from the uterus, in the space of from three to five days. The menses, are obstructed during pregnancy and lactation if the latter, however, is continued longer than the ordinary period, it is apt to return, and on its reappearance the milk becomes either vitiated, or its secretion entirely ~~suspended~~. That, the menstrual flux, is ^{uniformly & constantly} obstructed during pregnancy, is an assertion, which as yet remains unsettled. The weight of authority however, is undoubtedly in favour of the proposition.

Among



Among these, we find the celebrated
names of Baudelocque, ~~and~~ Denman and
in fact most of the modern writers on the
subject. There some times takes place from
the vagina, a bloody discharge, which recurs
with such periodical regularity, that,
upon a superficial examination, might
be mistaken for the true menstruous flu-
id. Of the occasional recurrence of such
cases we have the undoubted authority
of Drs Le Harman and Lamey. This cir-
cumstance, must have given origin to
the supposition of the menses continu-
ing through out utero gestation. But on
close enquiry into the nature of this dis-
charge, it would most unquestionably
present all the phenomena of hemor-
rhagic blood, viz. coagulability, and
exponation into its proximate parts.
Besides, the particular state of the
gravid



gravid uterus, would by no means admit of its recurrence, coexistent with conception. the cavity of the uterus is lined by the membrana decidua and but, a very short time elapses, before the os tinea. is hermetically sealed, as it were, by thick, tenacious mucus, thereby denying any communication between the uterine cavity, and the vagina.

Things, being thus circumstances, were the menses secreted, it would be poured out between the membrana decidua and propria, which would certainly destroy their connection (especially in the earlier months of pregnancy) and uterine hemorrhage would be the ^{for a time} consequence. Again, the specific action which the vessels of the uterus take on, for the formation and further development of this membrane, seems totally inconsistent

The first of these is the fact that the
the second is the fact that the
the third is the fact that the
the fourth is the fact that the
the fifth is the fact that the
the sixth is the fact that the
the seventh is the fact that the
the eighth is the fact that the
the ninth is the fact that the
the tenth is the fact that the
the eleventh is the fact that the
the twelfth is the fact that the
the thirteenth is the fact that the
the fourteenth is the fact that the
the fifteenth is the fact that the
the sixteenth is the fact that the
the seventeenth is the fact that the
the eighteenth is the fact that the
the nineteenth is the fact that the
the twentieth is the fact that the
the twenty-first is the fact that the
the twenty-second is the fact that the
the twenty-third is the fact that the
the twenty-fourth is the fact that the
the twenty-fifth is the fact that the
the twenty-sixth is the fact that the
the twenty-seventh is the fact that the
the twenty-eighth is the fact that the
the twenty-ninth is the fact that the
the thirtieth is the fact that the
the thirty-first is the fact that the
the thirty-second is the fact that the
the thirty-third is the fact that the
the thirty-fourth is the fact that the
the thirty-fifth is the fact that the
the thirty-sixth is the fact that the
the thirty-seventh is the fact that the
the thirty-eighth is the fact that the
the thirty-ninth is the fact that the
the fortieth is the fact that the
the forty-first is the fact that the
the forty-second is the fact that the
the forty-third is the fact that the
the forty-fourth is the fact that the
the forty-fifth is the fact that the
the forty-sixth is the fact that the
the forty-seventh is the fact that the
the forty-eighth is the fact that the
the forty-ninth is the fact that the
the fiftieth is the fact that the
the fifty-first is the fact that the
the fifty-second is the fact that the
the fifty-third is the fact that the
the fifty-fourth is the fact that the
the fifty-fifth is the fact that the
the fifty-sixth is the fact that the
the fifty-seventh is the fact that the
the fifty-eighth is the fact that the
the fifty-ninth is the fact that the
the sixtieth is the fact that the
the sixty-first is the fact that the
the sixty-second is the fact that the
the sixty-third is the fact that the
the sixty-fourth is the fact that the
the sixty-fifth is the fact that the
the sixty-sixth is the fact that the
the sixty-seventh is the fact that the
the sixty-eighth is the fact that the
the sixty-ninth is the fact that the
the seventieth is the fact that the
the seventy-first is the fact that the
the seventy-second is the fact that the
the seventy-third is the fact that the
the seventy-fourth is the fact that the
the seventy-fifth is the fact that the
the seventy-sixth is the fact that the
the seventy-seventh is the fact that the
the seventy-eighth is the fact that the
the seventy-ninth is the fact that the
the eightieth is the fact that the
the eighty-first is the fact that the
the eighty-second is the fact that the
the eighty-third is the fact that the
the eighty-fourth is the fact that the
the eighty-fifth is the fact that the
the eighty-sixth is the fact that the
the eighty-seventh is the fact that the
the eighty-eighth is the fact that the
the eighty-ninth is the fact that the
the ninetieth is the fact that the
the ninety-first is the fact that the
the ninety-second is the fact that the
the ninety-third is the fact that the
the ninety-fourth is the fact that the
the ninety-fifth is the fact that the
the ninety-sixth is the fact that the
the ninety-seventh is the fact that the
the ninety-eighth is the fact that the
the ninety-ninth is the fact that the
the hundredth is the fact that the

sistent with the menstrual secretion. For, this we see clearly exemplified, in cases of Dysmenorrhoea, dependent on ^{action} the way, or perverted, of the uterus forming the deciduous coat, and the first appearance of the healthy return of this discharge is the coming away of this membrane. Of the identity of the two membranes, we have the concurrent testimony of Drs Denman and Baillie. But on the contrary, what shall we say in reply to facts, incontrovertible opposing both and nail this doctrine. Dr Dewees, in his lectures on midwifery, cites two cases, in both of which the menses recur, as with the utmost punctuality throughout the earlier months of pregnancy: one of those women, was, the mother of thirteen children, and during each period of utero gestation, she menstruated

The first of these is the
 fact that the system is
 not a simple one, but a
 complex one, involving
 many different factors.
 The second is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The third is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The fourth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The fifth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The sixth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The seventh is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The eighth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The ninth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.
 The tenth is that the
 system is not a simple one,
 but a complex one, involving
 many different factors.

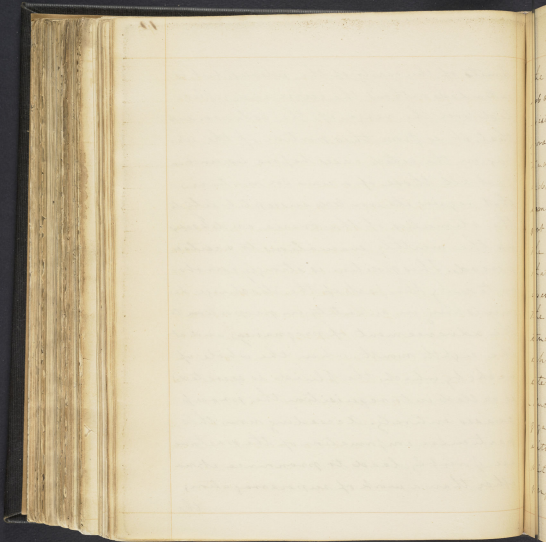
ted with perfect periodical regularity
for the first five or six months, and in
one instance, up to the eighth month of
pregnancy. This, very interesting case,
came within the immediate sphere ~~and~~
observation of Dr. Sowers himself, tis not
therefore hearsay, but the fact. In both
the discharge presented all the charac-
teristic marks of a genuine secretory ac-
tion of the uterus, a fluid perfectly clear
for a ted, and differing in every respect,
from that of extravasated blood.

Our reply, here will be, that we believe
these to be anomalies of nature, and
furthermore, that the fluid discharged,
is neither secreted within, or liberated
from the uterine cavity. But that, the
lining membrane, or *membrana pro-*
pria, in which this function greatly
depends, is not confined within the strict
limits

11

The first thing I noticed when I stepped
out of the car was the cold. It was a
sharp contrast to the warm blanket I had
been sitting under. The wind was biting,
and the snow was falling in soft, silent
flakes. I pulled my coat tighter around
me and walked towards the entrance of
the building. The door was open, and a
warm glow emanated from within. I
took a deep breath and stepped inside.
The interior was cozy and inviting, with
soft lighting and the scent of fresh
bread. I found a small table in the
corner and sat down, looking out at the
winter landscape. The snow-covered trees
and the distant lights of the town
created a peaceful scene. I felt a sense
of calm and solitude, a moment of
quiet reflection in the midst of a busy
world.

limits of the cavity of the uterus, but is extended without the cervix, and reflects over the verge of the os tincæ. and that, it is from this portion of the uterus, in the cited cases before us, and in fact all those of a similar nature; that regains its wonted susceptibility to the stimulus of the ovaria, and keeps up the monthly evacuations to a certain period. This position, is strongly corroborated, by the facts of the discharge diminishing in quantity in proportion to the advancement of pregnancy; and at the eighth month, when the whole of week (by which the fluids is secreted) is called into requisition the process ceases entirely. According now, this particular conformation of the parts, we are forcibly, leads to pronounce it, no other than a work of supplantation; the



the end of menstruation being perfect-
ed by conception, there would seem to
exist no further demands for the elab-
oration of this fluid. But it is con-
tended by some, tho' far from being pro-
ved, that the menstrual blood, is in
some way or other necessary for the sup-
port of the fecundated ovum; if this be
the fact, can we presume for a moment
that nature would be so blind in her
operations as to direct a passage for
the escape of that which was in-
tended and destined, for the nour-
ishment and growth of the fetus in
utero. By adverting to the humilistmo-
duct of her hands, as well, as those
gigantic fabrics, which are embraced
within the three kingdoms of the ha-
bitable globe, we see exemplified a
perfect obedience, to the strictest

laws

laws of economy, influenced by a
 sound and discriminating judgment.
 Besides, if a small globule of matter,
 (the fecundated ovum) demands for
 its nourishment, from three, to five
 ounces, which is the usual quantity
 secreted, what indeed, must be the
 amount demanded in the latter
 months of pregnancy? We can not be-
 lieve, that the quantum, is augment-
 ed, in proportion to the increased bulk
 and consequent exigencies of the
 foetus. We shall therefore, conclude
 this division of our subject, by re-
 marking, that the mystick curtain, is
 still suspended, before the presuma-
 ing penetration of mankind, in en-
 deavouring to unravel and explain the
 mysterious operations of nature. Much
 contrariety of opinion, has hitherto and



still exists, as regards the source and
 nature of this discharge. By some it
 is said, to be poured ^{out} or derived from
 the veins, others the arteries of the
 uterus; some maintain that it pro-
 ceeds from the vagina; and an opini-
 on of still more modern date is, that
 there are receptacles, or sinusses in the
 uterus for its collection. This last
 speculation, for truly, it is such, must
 have been fabricated in the closet,
 certainly not in the dissecting room.
 But on flying from the study, to the
 anatomical museum, to ascertain
 the truth of of this stretch of the
 imagination, with a heart bounding
 with joy, at the idea, of promulgating
 a probable theory, the eyes were dis-
 glected and beheld the imaginary sinus-
 ses. For surely, Morgagni, who dissected
 women

women at every stage of life, and under circumstances so propitious to the discovery, would have some where ^{with} met, declared, and recorded (if it existed) such an organization of the parts. We however, see or hear of no such thing; neither has subsequent experience demonstrated their existence. ~~It~~ From the vagina, why does an obstruction arise, dependent on diseased uterus, especially scirrhus? There certainly can obtain, no good reason for its absence under such circumstances, if this be opinion be true. But we have still stronger evidence against it; Dr Hunter declares, that in a case of inversion uterus, he saw this fluid to ooze or distill from the mouths of the tortuous vessels of the uterus; these are unequivocally the arteries, for all anatomists allow that the

the veins of the uterus are straight and partake not at all of the spiral direction of the arteries; consequently, it proceeds neither from the vagina, or the veins of the uterus, but, from the arteries. We are tho', by no means to consider this discharge as an extravasation, or hemorrhage, for on being collected, it will neither coagulate, or separate itself into parts like that of blood, extravasated from any other part of the body. Besides, it partakes not of the character of blood (as regards colour) from either the one or other system of vessels, being lighter than venous, and darker than arterial blood. We believe it (as all ready intimated, and for reasons which we shall hereafter assign) to be a *fluid sui generis*, the result of a secretory action
from

the arteries of the uterus. It seems some-
 what difficult, ~~unhom~~, to assign the
 honor of having first given publicity to
 this fact; tho' the credit is generally
 inscribed to Mr. L. Hunter, as being first
 at least in Great Britain, to treat of
 the menses under this character.

The causes of menstruation, are divided
 into those of the efficient; and final
 kind. To dwell on the various and mul-
 tiplic^{theories}ed, which have been erected and
 put forth, to account for the cause of
 this phenomenon, would be a task too
 tedious and unprofitable. Many are
 consigned to the tomb of silence, and
 could boast, but, of an ephemeral exis-
 tence; but there are others, that as yet,
 seem to claim some attention from writ-
 ters on this subject, not from any me-
 rit in themselves, but as being wholly
 incompatible

[Faint, illegible handwriting, likely bleed-through from the reverse side of the page.]

[Faint, illegible handwriting on the right edge of the page, possibly from the adjacent page.]

incompatible with the phenomena of menstruation, he deems it a duty to expose them as absurdities, and by so doing, endeavour to blot them out from the pages of medical history. Among the first of those theories, which we shall take notice of; is that, of lunar influence. By Aristotle and his followers, it was supposed, that the fluids of the human body, were, like the ocean, influenced according to the phases of the moon, hence he concluded that menstruation resembled the tides. This hypothesis, tho' is very promptly and effectually refuted, by the known fact, of women menstruating at every period of its increase and decline. Moreover, if this were true, why should not this discharge take place in men and all the inferior animals for they are equal
 ly

by as
exp. G
lie de
at p
like
book
of the
my ac
times
his f
of q
m
the
4, 16
Gump
rent
the s
own
Indo
aff

by as much exposed to its nocturnal rays. Galen, perceiving the absurdity of this doctrine, said it arose from general plethora. But in this, we discover a like inconsistency; for we know, that blood detracted from any other part of the system, prior to, or during the very act of menstruation, to several times the quantity, does not interrupt this flow; also, the amount discharged is as great from the feeble and infirm women, as from the hearty and robust. To the foregoing objections may be added, the instance of the celebrated Hungarian sisters, who, from monstrous formation were united together, although the same blood flowed in each, on account of the anastomoses of the abdominal blood vessels at the loins, ^{the} difference frequently, both in the
period

It is much more difficult to understand
the human mind than it is to understand
the human body. The human mind is
a vast and complex system of ideas and
feelings. It is not a simple machine that
can be understood by a few rules and
principles. It is a living and growing
organism that is constantly changing and
developing. The human mind is the most
valuable and precious thing that we have.
It is the source of all our knowledge and
wisdom. It is the source of all our art and
science. It is the source of all our love and
compassion. We must learn to understand
our minds and to control them. We must
learn to think clearly and to feel deeply.
We must learn to live our lives with
purpose and meaning. We must learn to
love ourselves and to love others. We
must learn to be good and to be happy.

period, and quantity of their menstruation. It has also been attributed to fermentation. By the chemists, who farther, this theory, it was contended; that at the time of puberty, there existed in the uterus, a venereal asters or leaven, and, that certain salts were thrown off by the uterine arteries, which produced this fermentation. How their ingenuity, could convert the uterus into a chemical laboratory, we are at a loss to fancy; for certainly no part of that viscus, is as yet discovered that seems calculated for such an office. By Cullen, to whom we owe so much, and whose ingenuity, seemed paramount (if possible) with his judgment, menstruation is ascribed to the agency of partial plethora, or topical congestion. This position runs thus, that all the parts
of

of the
space
between
the two
pages
is the
same.
The
loose
leaf
is
not
bound
in
the
book.

of the system were regularly, and successively evolved, and that the evolution of each particular part must especially depend, upon that plethora or increased congestion in its proper vessels. This, he supposes to be the situation of the uterus at the menarche of puberty, and that this congestion, or increased determination of blood to its vessels, either by its mechanical distention, forcing the extremities of the uterine arteries terminating on the surface of its cavity, and thereby causing an effusion of blood there, or, by its presence stimulating the vessels, and exciting in them an hemorrhagic effort which forces their extremities, and consequently, producing the same effect. In either way he accounts for the

First

first appearance of blood from the
 uterus. This emptied and relaxed
 condition of the vessels of the ute-
 rus, gives rise to a new congestion in
 them, so as to put them on a balance
 with the rest of the system, till they
 are again brought to that degree of
 distention, or, induce a new hemo-
 rhagic effort, producing the same
 result as in the former or first in-
 stance. Thus an evacuation of blood
 from the uterus being once established,
 he concludes, (reasoning by analogy a-
 lone, from the known disposition of
 system to contract certain habits)
 that the monthly evacuations, depend
 on a balance or equipoise of the circula-
 tion, kept up by the force of habit.
 But this beautiful and ingenious
 theory, must share the melancholy
 fate

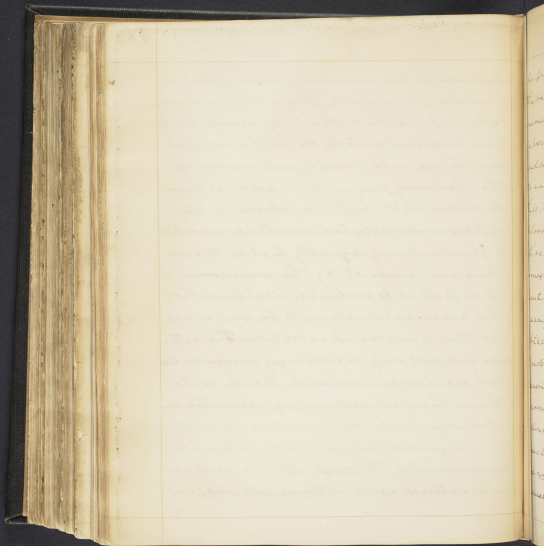
late of those, that preceded it, as being totally inadequate to explain all the phenomena of menstruation. Admitting this local determination, which evidently is the fact, what does it prove? "Every gland when excited by its appropriate stimulus, becomes a center of fluxion. This is very fairly manifested, in the testicle; which, being stimulated by lascivious ideas, secretes the semen masculinum. The proposition also holds good as regards the uterus; it, also is called into action by the stimulus derived from the ovaria; upon the existence, and perfectly sound and developed state of ~~which~~, essentially depends the healthy performance of this function." This is proven by the experiments of Mr Pott, and from the fact of the
 menses

menses, being retained, or suppressed in diseased states of these organs. If this congestion of the vessels, or the hemorrhagic ^{effluent} induced by the distention, is the cause of menstruation; evidently, the effused fluid should and would present all the characteristic marks of hemorrhagic blood. But this we deny for reasons already assigned. The last theory, that we shall take notice of, to account for the cause of this all important function, and in the accuracy of which we acknowledge our belief; is that, of the existence of a secretory action resident in the uterus. In confirmation of this opinion, we have the united voice of Drs Denman, Burns, Lamez, Chapman and Demers. Supported by such authority, I do not hesitate a moment, to repose with con-

fidence

confidence in the adapted position. But to give further validity, than the mere recital of names, altho' they stand among the brightest satellites of the medical world, we will briefly cite some of the leading arguments adduced in its support. 1st That the uterus in its villous and vascular structure resembles a gland, being equally liable to scirrhus or cancer. 2^d By the arrangement of its vessels, it is evidently designed, that the circulation should be impeded for the purpose of secretion. The arteries are not only exceedingly convoluted, but are larger, and with thinner coats than their corresponding veins. Haller also says, that the blood is brought in larger quantities to the womb, and move quickly through its lax and ample arteries, and returns with difficulty.

ty



ty, from the rigidity and narrowness of the veins. 35 That, in many of the inferior animals, during the season of venereal inclination, there is an uterine effusion, undoubtedly a secretion, which seems to answer the same end as menstruation; this then differs from the menstrual blood, as regards, colour, not assuming its red hue. If this venereal desire be, comes violently exasperated, from confinement, or other causes, the discharge assumes a sanguineous appearance; this frequently obtaining in the bitch, kept from the male. And lastly, that the menses are a fluid sui generis, or, at least differing very essentially from blood, as appearing neither its colour, colour, or coagulability, and in chemical analyses presenting different results. If this be not truly, the efficient and physical cause of menstruation, its influence has at least

least, direct to much of suspicion from the treatment, of ^{the} diseases & actions of this function, and has enabled the practitioner, to direct with much ^{more} precision, and prospect of success, those articles of the Mat. Med. called emmenagogues which have been so much abused and stigmatized by preceding generations. The ultimate, or final end of menstruation, is, to give to the uterus, an aptitude to conception. Little, or no diversity of sentiment, now exist as respects the accuracy of this opinion; nay, it may be called a fact. Under such circumstances, we deem it wholly unnecessary, to enter into any argument or statement of facts in its support. We shall therefore conclude finally; hoping that we have done the subject partial justice; and that, if it meets not decided approbation, it will at least answer the end for which it is destined.

Finis.

